Amendment to the Claims:

Listing of the Claims

The listing of claims will replace all prior versions, and listings, of claims in the application:

Claims 1 and 2 (Cancelled)

Claim 3 (Currently Amended): A rapid dissolving reinforcing filler composition for organic systems comprising an effective amount of surface-modified, aerosol doped-pyrogenically produced oxides wherein the dopants are selected from cerium, aluminum, potassium or salts or oxides thereof, wherein the pyrogenically produced oxides are selected from the group consisting of SiO_2, Al_2O_3, TiO_2, B_2O_3, ZrO_2, In_2O_3, ZnO, Fe_2O_3, Nb_2O_5, V_2O_5, WO_3, SnO_2 and GeO_2, and wherein the surface modification is a hydrophobic surface obtained by spraying the pyrogenic oxides, where the BET surface is between 40 and 217 m^2/g and the dopant is homogeneously distributed within the pyrogenically produced oxide, with one or several compounds selected from the following groups:

a) Organosilanes having either formula $(RO)_3Si(C_nH_{2n+1})$ or $(RO)_3Si(C_nH_{2n-1})$, wherein

R = alkyl, and

n = 1 – 20;

b) Organosilanes having either formula $R'_x(RO)_ySi(C_nH_{2n+1})$ or $(RO)_3Si(C_nH_{2n+1})$, wherein

R = alkyl,

R' = alkyl,

R' = cycloalkyl

n = 1 – 20,

x+y = 3,

x = 1 or 2, and

y = 1 or 2;

c) Halogen organosilanes having either formula $X_3 Si(C_nH_{2n+1})$ or $X_3 Si(C_nH_{2n-1})$, wherein

X = Cl or Br, and

n = 1 – 20;

d) Halogen organosilanes having either formula $X_2 (R') Si(C_nH_{2n+1})$ or

$X_2 (R') Si(C_nH_{2n-1})$, wherein

X = Cl or Br

R' = alkyl or cycloalkyl, and

n = 1 – 20;

e) Halogen organosilanes having formula $X (R')_2 Si(C_nH_{2n+1})$ or

$X (R')_2 Si(C_nH_{2n-1})$, wherein

X = Cl or Br;

R' = alkyl or cycloalkyl, and

n = 1 – 20;

f) Organosilanes having the formula $(RO)_3Si(CH_2)_m$-R'

R = alkyl,

m = 0 or 1-20, and

R' = methyl-, aryl-, $-C_6H_5$, substituted phenyl groups,

$-C_4F_9$, OCF_2-CHF-CF_3, $-C_6F_{13}$, -O-CF_2-CHF_2,

$-NH_2$, $=N_3$, -SCN, -CH=CH_2, -NH- CH_2-CH_2-NH_2,

-N-(CH_2-CH_2-CH_2NH_2)$_2$,

$-OOC(CH_3)C = CH_2$,

$-OCH_2$-CH(O) CH_2,

-NH-CO-N-CO- $(CH_2)_5$,

-NH-COO-CH_3, -NH-COO-CH_2-CH_3, -NH-$(CH_2)_3Si(OR)_3$,

-SH or

-NR'R''R''', wherein R' = alkyl, or aryl; R'' = H, alkyl, aryl; and R''' = H, alkyl, aryl, benzyl, or $C_2H_4N(R'''')_2$, wherein R'''' = H, or alkyl;

g) Organosilanes having the formula $(R'')_x$ $(RO)_y$ $Si(CH_2)_m$-R', wherein

R'' = alkyl or cycloalkyl,

x+y = 2,

x = 1 or 2,

y = 1 or 2,

m = 0 or 1 to 20, and

R' = methyl-, aryl, -C_6H_5, substituted phenyl groups,

-C_4F_9, -OCF_2-CHF-CF_3, -C_6F_{13}, -O-CF_2-CHF_2,

-NH_2, -N_3, SCN, -CH= CH_2, -NH-CH_2-CH_2-NH_2,

-N-(CH_2-CH_2-NH_2)$_2$,

-OOC (CH_3)C = CH_2,

-OCH_2-CH(O) CH_2,

-NH-CO-N-CO-(CH_2)$_5$,

-NH-COO-CH_3, -NH-COO-CH_2-CH_3, -NH-(CH_2)$_3$Si(OR)$_3$,

-SH or

-NR'R''R''', wherein R' = alkyl or aryl; R'' = H,

alkyl, or aryl; and R''' = H, alkyl, aryl, benzyl, or

C_2H_4N(R'''')$_2$, wherein R'''' = H, or alkyl ;

h) Halogen organosilanes having the formula X_3Si (CH_2)$_m$-R', wherein

X = Cl or Br,

m = 0 or 1 – 20,

R' = methyl-, aryl, -C_6H_5, substituted phenyl groups

-C_4F_9, -OCF_2-CHF-CF_3, -C_6F_{13}, -O-CF_2-CHF_2,

-NH_2, -N_3, SCN, -CH=CH_2, -NH-CH_2-CH_2-NH_2,

-N-(CH_2-CH_2-NH_2)$_2$,

-OOC $(CH_3)C = CH_2$,

$-OCH_2-CH(O)\ CH_2$,

$-NH-CO-N-CO-(CH_2)_5$,

$-NH-COO-CH_3$, $-NH-COO-CH_2-CH_3$, $-NH-(CH_2)_3Si(OR)_3$, or

-SH;

i) Halogen organosilanes having the formula $(R)X_2Si(CH_2)_m-R'$, wherein

X = Cl or Br,

R = alkyl such as methyl-, ethyl-, or propyl-,

m = 0 or 1 – 20, and

R' = methyl-, aryl- , $-C_6H_5$, substituted phenyl groups,

$-C_4F_9$, $-OCF_2-CHF-CF_3$, $-C_6F_{13}$, $-O-CF_2-CHF_2$,

$-NH_2$, $-N_3$, SCN, $-CH=CH_2$, $-NH-CH_2-CH_2-NH_2$,

$-N-(CH_2-CH_2-NH_2)_2$,

$-OOC\ (CH_3)C = CH_2$,

$-OCH_2-CH(O)\ CH_2$,

$-NH-CO-N-CO-(CH_2)_5$,

$-NH-COO-CH_3$, $-NH-COO-CH_2-CH_3$,

$-NH-(CH_2)_3Si(OR)_3$ or

-SH;

(j) Halogen organosilanes having the formula $(R)_2X\ Si(CH_2)_m-R'$, wherein

X = Cl or Br,

R = alkyl,

m = 0 or 1 – 20, and

R' = methyl-, aryl-, $-C_6H_5$, substituted phenyl groups,

$-C_4F_9$, $-OCF_2-CHF-CF_3$, $-C_6F_{13}$, $-O-CF_2-CHF_2$,

$-NH_2$, $-N_3$, SCN, $-CH=CH_2$, $-NH-CH_2-CH_2-NH_2$,

$-N-(CH_2-CH_2-NH_2)_2$,

$-OOC\ (CH_3)C = CH_2$,

$-OCH_2-CH(O)\ CH_2$,

$-NH-CO-N-CO-(CH_2)_5$,

$-NH-COO-CH_3$, $-NH-COO-CH_2-CH_3$, $-NH-(CH_2)_3Si(OR)_3$ or

-SH;

(k) Silazanes having the formula

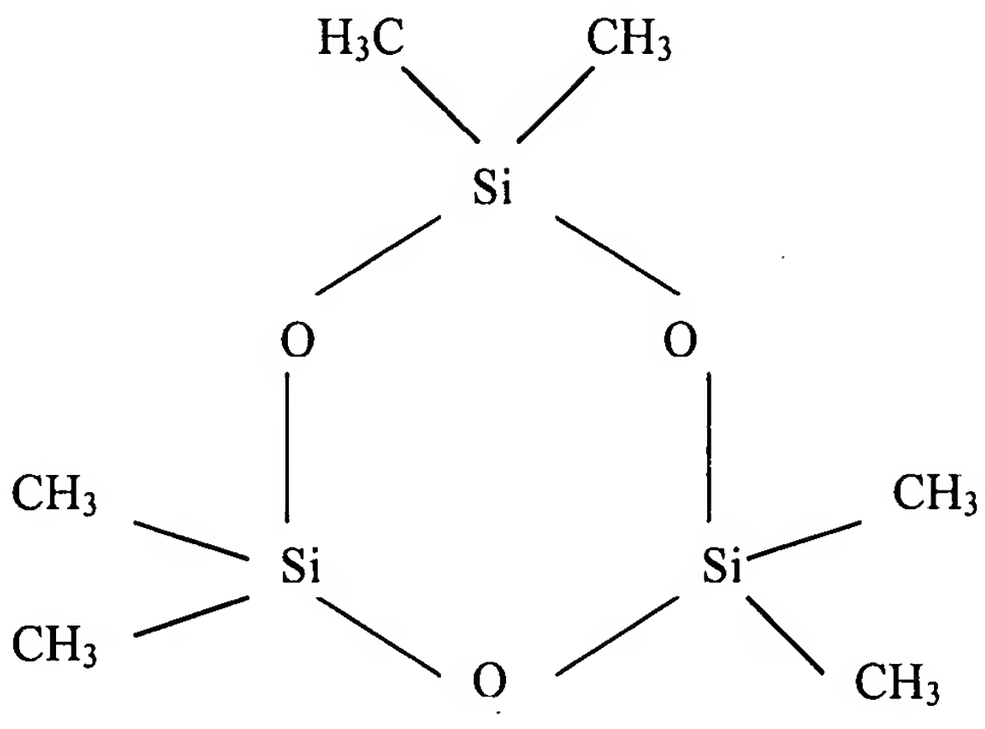
$$R'R_2Si-N-SiR_2R'$$
$$|$$
$$H$$

wherein R = alkyl, and

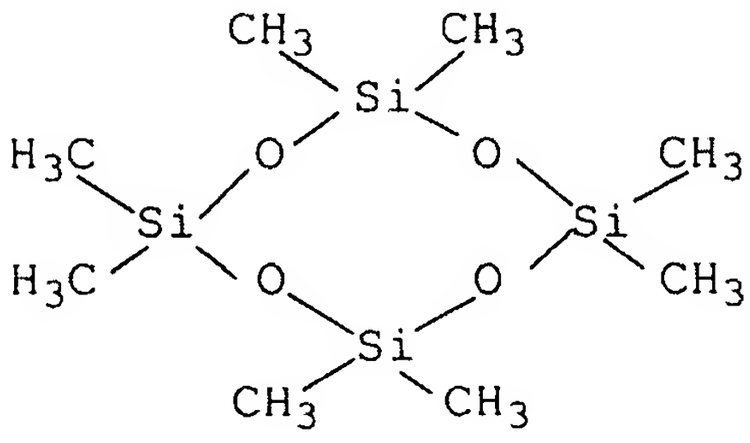
R' = alkyl or vinyl; or

(l) Cyclic polysiloxanes D 3, D 4 or D 5,

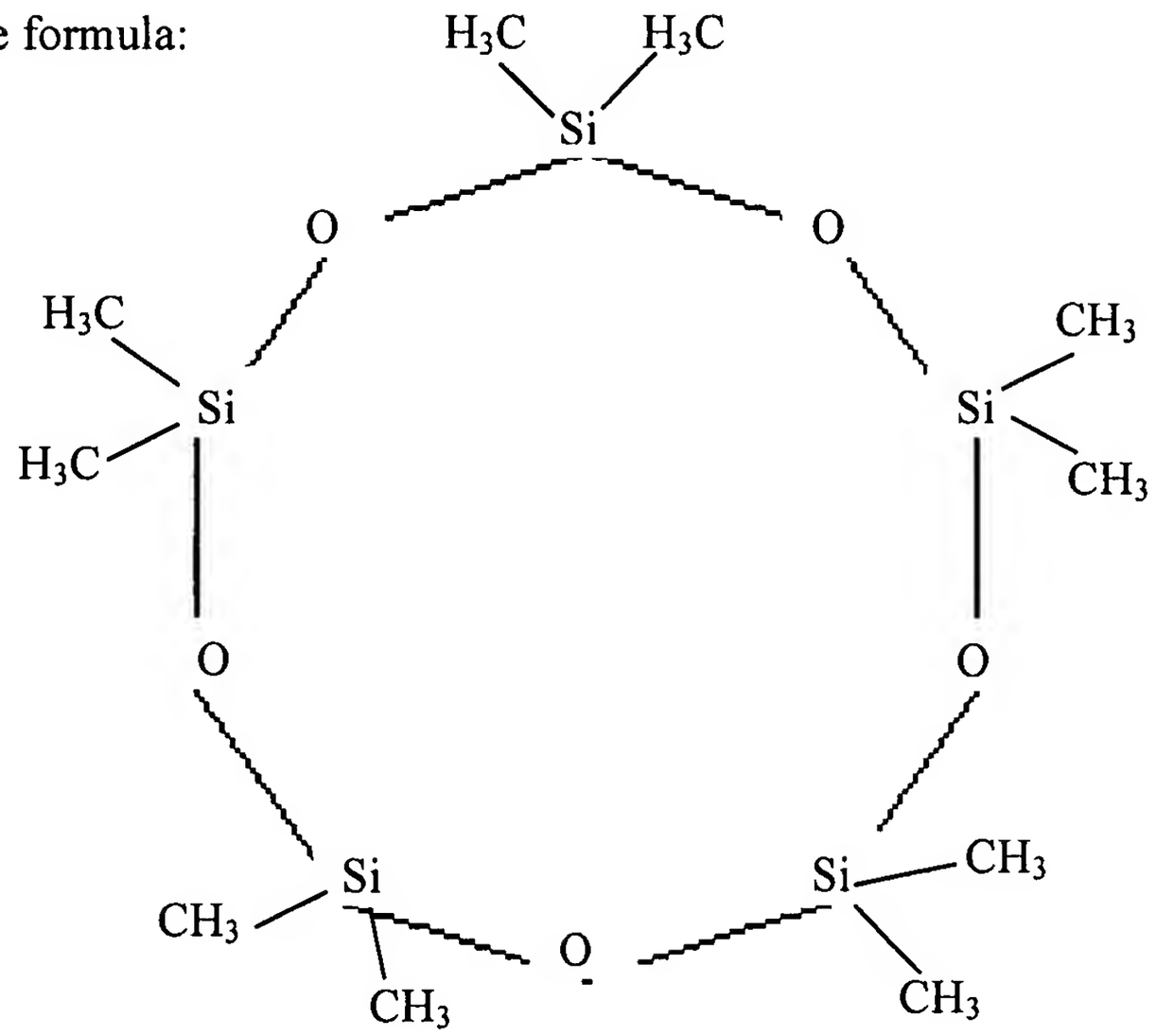
where 1) D3 has the formula:



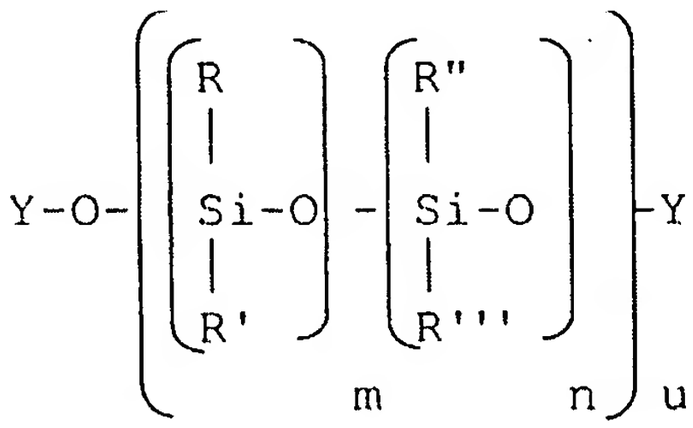
2) D4 has the formula:



and 3) D5 has the formula:



m) Polysiloxanes or silicone oils having any one of the formula



m = 0,1,2,3,...∞
n = 0,1,2,3,...∞
u = 0,1,2,3,...∞

Y=CH_3, H, C_nH_{2n+1} n=1-20
Y=$Si(CH_3)_3$, $Si(CH_3)_2H$

, $Si(CH_3)_2OH$, $Si(CH_3)_2(OCH_3)$ or

$Si(CH_3)_2(C_nH_{2n+1})$, wherein n=1-20,

wherein,

R = alkyl, aryl, $(CH_2)_n$-NH_2 or H,

R' = alkyl, aryl, $(CH_2)_n$-NH_2 or H,

R'' = alkyl, aryl, $(CH_2)_n$-NH_2 or H,

R'''= alkyl, aryl, $(CH_2)_n$-NH_2 or H.

Claim 4 (Currently amended): A method of producing aerosol doped, surface-modified pyrogenically produced oxides, comprising placing aerosol doped-pyrogenically produced oxides, where the BET surface is between 40 and 217 m^2/g and the dopant is homogeneously distributed within the pyrogenically produced oxide, in a suitable mixing container, spraying the oxides with water and/or acid and then spraying the oxides under intensive mixing with the surface-modification reagent or a mixture of several surface-modification reagents under conditions where oxygen is excluded, to form the aerosol doped, surface-modified, pyrogenically produced oxides, wherein the dopants are selected from cerium, aluminum, potassium, or salts or oxides thereof, wherein the oxides are selected from the group consisting of SiO_2, Al_2O_3, TiO_2, B_2O_3, ZrO_2, In_2O_3, ZnO, Fe_2O_3, Nb_2O_5, V_2O_5, WO_3, SnO_2 and GeO_2, wherein the surface-modification reagent or a mixture of several surface-modification reagents are selected from the following groups:

a) Organosilanes having either formula $(RO)_3Si(C_nH_{2n+1})$ or $(RO)_3Si(C_nH_{2n-1})$, wherein

R = alkyl, and

n = 1 – 20;

b) Organosilanes having either formula $R'_x(RO)_ySi(C_nH_{2n+1})$ or $(RO)_3Si(C_nH_{2n+1})$, wherein

R = alkyl,

R' = alkyl,

R' = cycloalkyl

n = 1 – 20,

x+y = 3,

x = 1 or 2, and

y = 1 or 2;

c) Halogen organosilanes having either formula X_3 $Si(C_nH_{2n+1})$ or X_3 $Si(C_nH_{2n-1})$, wherein

X = Cl or Br, and

n = 1 – 20;

d) Halogen organosilanes having either formula X_2 (R') $Si(C_nH_{2n+1})$ or

X_2 (R') $Si(C_nH_{2n-1})$, wherein

X = Cl or Br

R' = alkyl or cycloalkyl, and

n = 1 – 20;

e) Halogen organosilanes having formula X $(R')_2$ $Si(C_nH_{2n+1})$ or

X $(R')_2$ $Si(C_nH_{2n-1})$, wherein

X = Cl or Br;

R' = alkyl or cycloalkyl, and

n = 1 – 20;

f) Organosilanes having the formula $(RO)_3Si(CH_2)_m$-R'

R = alkyl,

m = 0 or 1-20, and

R' = methyl-, aryl-, $-C_6H_5$, substituted phenyl groups,

$-C_4F_9$, OCF_2-CHF-CF_3, $-C_6F_{13}$, -O-CF_2-CHF_2,

$-NH_2$, $=N_3$, -SCN, -CH=CH_2, -NH- CH_2-CH_2-NH_2,

-N-(CH_2-CH_2-CH_2NH_2)$_2$,

$-OOC(CH_3)C = CH_2$,

$-OCH_2$-CH(O) CH_2,

-NH-CO-N-CO- $(CH_2)_5$,

-NH-COO-CH_3, -NH-COO-CH_2-CH_3, -NH-$(CH_2)_3Si(OR)_3$,

-SH or

-NR'R''R''', wherein R' = alkyl, or aryl; R'' = H, alkyl, aryl; and R''' = H, alkyl, aryl,

benzyl, or $C_2H_4N(R'''')_2$, wherein R'''' = H, or alkyl;

g) Organosilanes having the formula $(R'')_x$ $(RO)_y$ $Si(CH_2)_m$-R', wherein

R'' = alkyl or cycloalkyl,

x+y = 2,

x = 1 or 2,

y = 1 or 2,

m = 0 or 1 to 20, and

R' = methyl-, aryl, $-C_6H_5$, substituted phenyl groups,

$-C_4F_9$, $-OCF_2-CHF-CF_3$, $-C_6F_{13}$, $-O-CF_2-CHF_2$,

$-NH_2$, $-N_3$, SCN, $-CH=CH_2$, $-NH-CH_2-CH_2-NH_2$,

$-N-(CH_2-CH_2-NH_2)_2$,

$-OOC(CH_3)C=CH_2$,

$-OCH_2-CH(O)CH_2$,

$-NH-CO-N-CO-(CH_2)_5$,

$-NH-COO-CH_3$, $-NH-COO-CH_2-CH_3$, $-NH-(CH_2)_3Si(OR)_3$,

-SH or

$-NR'R''R'''$, wherein R' = alkyl or aryl; R'' = H,

alkyl, or aryl; and R''' = H, alkyl, aryl, benzyl, or

$C_2H_4N(R'''')_2$, wherein R'''' = H, or alkyl ;

h) Halogen organosilanes having the formula $X_3Si(CH_2)_m-R'$, wherein

X = Cl or Br,

m = 0 or 1 – 20,

R' = methyl-, aryl, $-C_6H_5$, substituted phenyl groups

$-C_4F_9$, $-OCF_2-CHF-CF_3$, $-C_6F_{13}$, $-O-CF_2-CHF_2$,

$-NH_2$, $-N_3$, SCN, $-CH=CH_2$, $-NH-CH_2-CH_2-NH_2$,

$-N-(CH_2-CH_2-NH_2)_2$,

-OOC $(CH_3)C = CH_2$,

-OCH_2-CH(O) CH_2,

-NH-CO-N-CO-$(CH_2)_5$,

-NH-COO-CH_3, -NH-COO-CH_2-CH_3, -NH-$(CH_2)_3Si(OR)_3$, or

-SH;

i) Halogen organosilanes having the formula $(R)X_2Si(CH_2)_m$-R', wherein

X = Cl or Br,

R = alkyl such as methyl-, ethyl-, or propyl-,

m = 0 or 1 – 20, and

R' = methyl-, aryl- , $-C_6H_5$, substituted phenyl groups,

$-C_4F_9$, $-OCF_2$-CHF-CF_3, $-C_6F_{13}$, -O-CF_2-CHF_2,

-NH_2, -N_3, SCN, -CH=CH_2, -NH-CH_2-CH_2-NH_2,

-N-$(CH_2$-CH_2-$NH_2)_2$,

-OOC $(CH_3)C = CH_2$,

-OCH_2-CH(O) CH_2,

-NH-CO-N-CO-$(CH_2)_5$,

-NH-COO-CH_3, -NH-COO-CH_2-CH_3,

-NH-$(CH_2)_3Si(OR)_3$ or

-SH;

(j) Halogen organosilanes having the formula $(R)_2X$ $Si(CH_2)_m$-R', wherein

X = Cl or Br,

R = alkyl,

m = 0 or 1 – 20, and

R' = methyl-, aryl-, $-C_6H_5$, substituted phenyl groups,

$-C_4F_9$, $-OCF_2-CHF-CF_3$, $-C_6F_{13}$, $-O-CF_2-CHF_2$,

$-NH_2$, $-N_3$, SCN, $-CH=CH_2$, $-NH-CH_2-CH_2-NH_2$,

$-N-(CH_2-CH_2-NH_2)_2$,

$-OOC(CH_3)C = CH_2$,

$-OCH_2-CH(O)CH_2$,

$-NH-CO-N-CO-(CH_2)_5$,

$-NH-COO-CH_3$, $-NH-COO-CH_2-CH_3$, $-NH-(CH_2)_3Si(OR)_3$ or

-SH;

(k) Silazanes having the formula

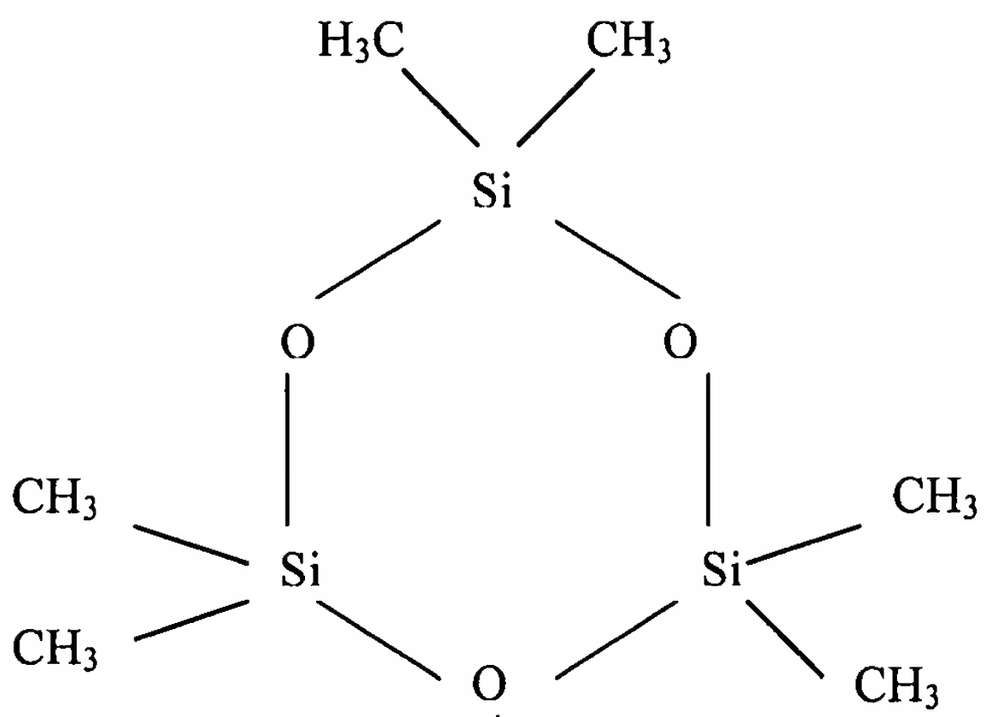
$$R'R_2Si-N-SiR_2R'$$
$$|$$
$$H$$

wherein R = alkyl, and

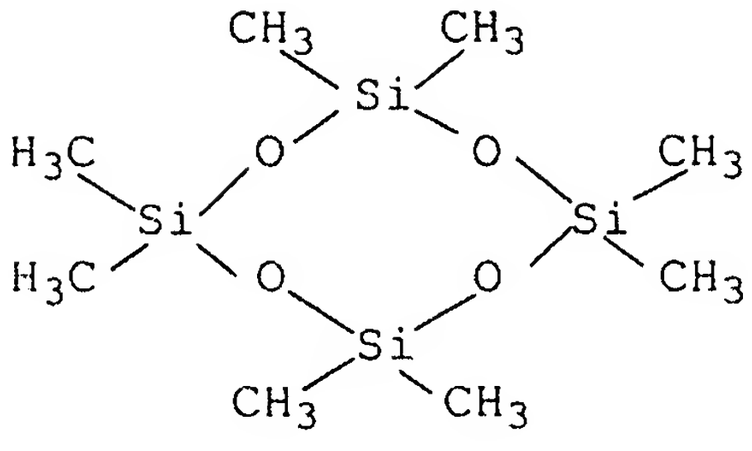
R' = alkyl or vinyl; or

(l) Cyclic polysiloxanes D 3, D 4 or D 5,

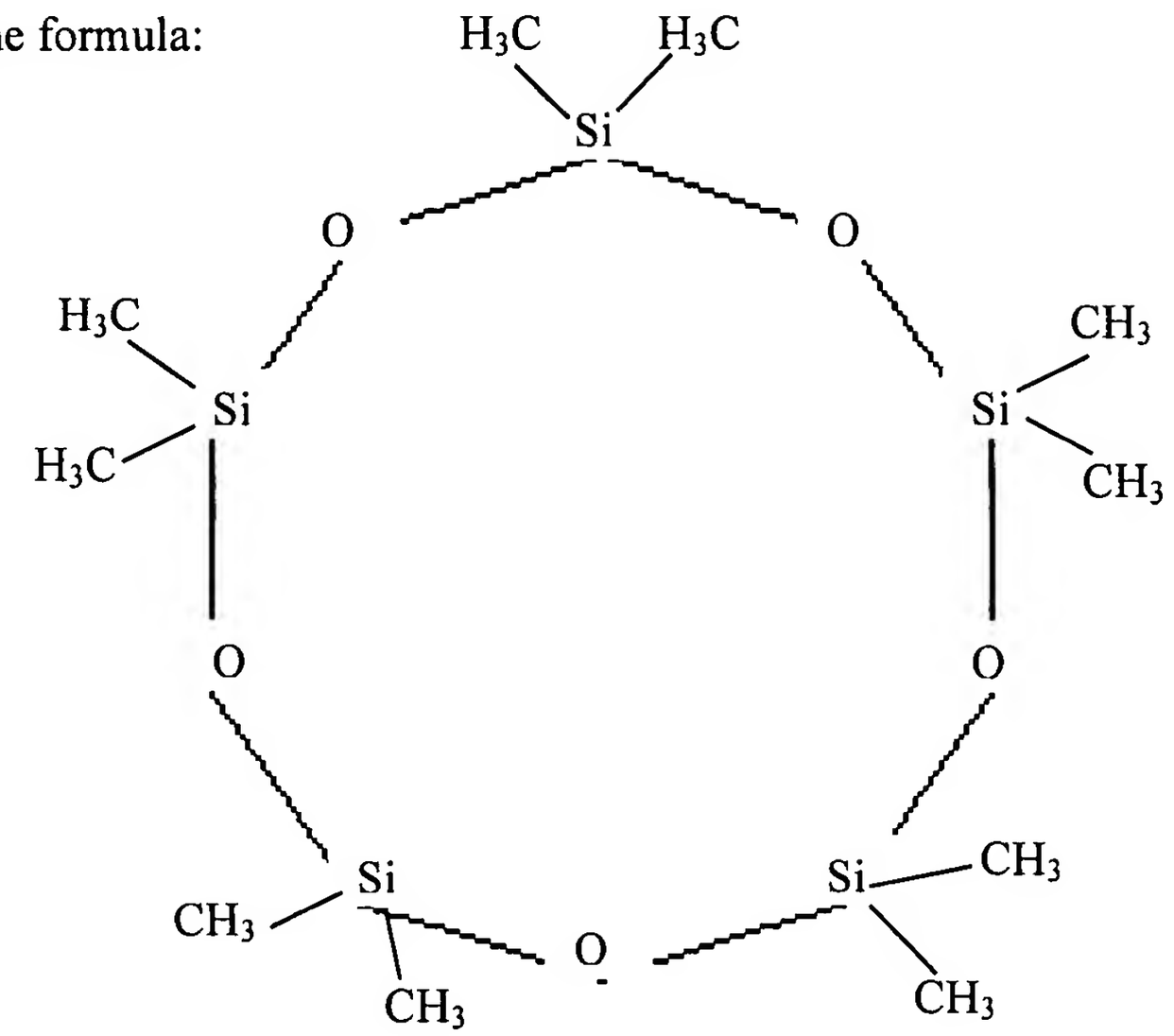
where 1) D3 has the formula:



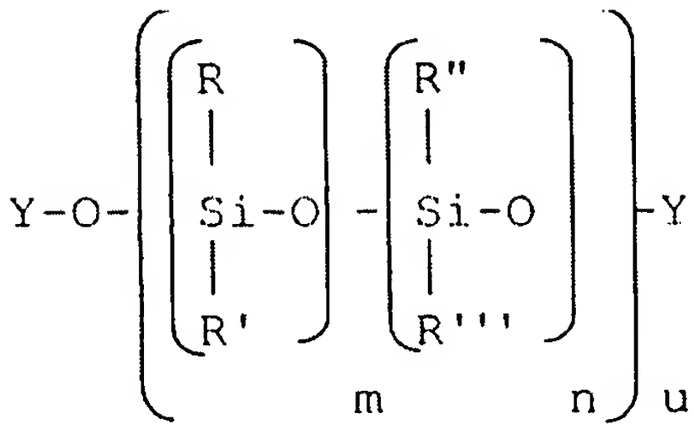
2) D4 has the formula:



and 3) D5 has the formula:



m) Polysiloxanes or silicone oils having any one of the formula



m = 0,1,2,3,...∞
n = 0,1,2,3,...∞
u = 0,1,2,3,...∞

Y=CH_3, H, C_nH_{2n+1} n=1-20
Y=$Si(CH_3)_3$, $Si(CH_3)_2H$

, $Si(CH_3)_2OH$, $Si(CH_3)_2(OCH_3)$ or

$Si(CH_3)_2(C_nH_{2n+1})$, wherein n=1-20,

wherein,

R = alkyl, aryl, $(CH_2)_n$-NH_2 or H,

R' = alkyl, aryl, $(CH_2)_n$-NH_2 or H,

R'' = alkyl, aryl, $(CH_2)_n$-NH_2 or H,

R'''= alkyl, aryl, $(CH_2)_n$-NH_2 or H.

Claims 5 and 6 (Cancelled).

Claim 7 (Currently amended) The method of claim 4 further comprising re-mixing the surface modification agent(s) and the aerosol doped, surface-modified, pyrogenically produced oxides for 15 to 30 minutes and tempering at a temperature of 100 to 400 °C for a period of 1 to 6 hours.

Claim 8 (Previously presented) The surface-modified, pyrogenically produced oxides according to claim 3 wherein the cyclic polysiloxanes is D 4.

Claims 9 -12 (Cancelled)

Claim 13 (New) The surface-modified, pyrogenically produced oxides according to claim 3 wherein the dopant is aluminum oxide and the pyrogenically produce oxide is silica.

Claim 14 (New) The method according to claim 4 wherein the dopant is aluminum oxide and the pyrogenically produce oxide is silica.